### **REMARKS**

#### **Drawings**

On page 2 of his Office action, the Examiner objected to the drawings because "various items lack a descriptive label". Applicant has amended the drawings in a good faith effort to address any concerns the Examiner may have had. However, Applicant notes that the Examiner did provide specific instructions as to which drawings he found unsatisfactory, and requests that such instructions be provided in any future Office action, if still further changes are deemed necessary.

Also, Applicant notes that drawings are required to include labels or legends only "where necessary for understanding of the drawing...They should contain as few words as possible." (37 CFR 1.84(o)).

## Claim Objections

The Examiner objected to Claims 17-19 as being "of improper dependent form for failing to further limit the subject matter of a previous claim...The claims are written in the form of a preamble made to depend on another claim."

Applicant has amended these claims to make it clear that they do not consist simply of a preamble. In fact, the preamble of these claims is "A computer program product" and the claimed subject matter is "a computer readable medium, the medium including machine-readable instructions for carrying out the steps" of a particular claim. As noted in MPEP 608.01(n) III:

The fact that the independent and dependent claims are in different statutory classes does not, in itself, render the latter improper. Thus, if claim 1 recites a specific product, a claim for the method of making the product of claim 1 in a particular manner would be a proper dependent claim since it could not be infringed without infringing claim 1. Similarly, if claim 1 recites a method of making a product, a claim for a product made by the method of claim 1 could be a proper dependent claim...

Thus, the fact that Applicant's Claims 1, 15, and 16 are drawn to methods and Claims 17, 18, and 19 are drawn to computer program products related to those methods does not *per se* render Claims 17, 18, and 19 improper.

# Claim Rejections under 35 USC 103

The Examiner rejected Claims 1-6, 8-13, and 15-19 as being unpatentable over US Patent 5,767,852 to Keller et al. ("Keller") and US Patent 5,623,592 to Carlson et al. ("Carlson").

In response, Applicant has amended the claims to better define the subject matter he regards as his invention.

Independent Claims 1 and 15 (see also newly added Claim 30) have been amended to include a limitation that each of the pieces in the hierarchical tree has "a shape that i) corresponds to a type of task, and that ii) is different from the shape of a piece in the tree corresponding to a different type of task". In addition, Claims 1 and 15 have been amended to include a limitation that the attachment pieces (called a "second piece" in Claim 15) have respective shapes such that when an attachment piece and a piece in the hierarchical tree

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have matching shapes, they correspond to a way of completing a task that can be selected by a user. Support for these amendments can be found in Figures 1 and 2, and throughout the specification generally.

These amendments to independent Claims 1 and 15 fully distinguish Keller and Carlson, which do not teach or hint at these limitations, and therefore these claims should be allowable.

Likewise, the claims dependent from Claims 1 and 15 should also be allowable.

Applicant maintains that dependent Claims 2-14 are directed to features that are patentable in combination with the subject matter of Claim 1.

For example, Claim 4 (see also newly added Claim 25) states that "one of the attachment pieces and said one of the connector pieces have matching colors prior to said proximity positioning, to aid the user in matching said one of the attachment pieces and said one of the connector pieces", as discussed on page 8 of the specification, beginning on line 21. The icons of Keller, on the other hand, change their color *in response to* a particular priority designation (see col. 5, line 62 through col. 6, line 10 of Keller); color is not used in Keller for the purpose *matching* pieces.

Also, Claim 6 (see also newly added Claim 26) states that "one of the attachment pieces and said one of the connector pieces have matching images thereon prior to said proximity positioning, to aid the user in matching said one of the attachment pieces and said one of the connector pieces", as discussed on page 8 of the specification, beginning on line 21. The icons of Keller, on the other hand, may alter their appearance *in response to* a

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particular priority designation (see col. 5, line 62 through col. 6, line 10 of Keller); images are not used in Keller for the purpose of *matching* pieces (see col. 5, line 62 through col. 6, line 10 of Keller).

With respect to Claim 8, none of the cited prior art teaches "initially placing said one of the attachment pieces next to a piece other than said one of said connector pieces, in which said one of said attachment pieces is then repositioned to appear interconnected with said one of the connector pieces" (emphasis added).

With respect to Claim 9, "moving said one of the attachment pieces from one part of the tree to another part of the tree" is an action that none of the cited references makes use of and that none has a need for.

Independent Claim 16 was rejected by the Examiner, who pointed to col. 7, lines 5-10 of Carlson, who teaches:

"...a user clicks on device icon 210 and drags a copy of the device icon 210 into experiment design region 206 four times. The four copies are illustrated as device icons 224, 226, 228 and 230. If the settings of an instrument must be changed during an experiment, then a separate device icon is created for each setting configuration in which the instrument will be used..." (see col. 7, lines 4-10 of Carlson)

This is far removed, however, from the subject matter of Claim 16, which has been amended to more clearly define the subject matter Applicant regards as his invention. Claim 16 specifies that "the created piece is taken from a database and is inserted in the displayed tree in the event that there is no piece in the tree that matches the additional piece and the created piece is required in the tree as a parent to the additional piece, thereby communicating to the

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user that additional selections must be made" (emphasis added), which is subject matter that is discussed on pages 12 and 17 of the specification. None of the cited references teach or suggest these limitations.

The Examiner rejected Claims 7 and 14 as being unpatentable over Keller, Carlson, and US Patent 6,324,498 to Wajda ("Wajda").

Applicant has made amendments to independent Claim 1 which render the Examiner's objection with respect to Claims 7 and 14 moot.

Applicant wishes to comment on his use of a tree in which pieces are arranged reflecting a hierarchy of tasks. In this regard, it is helpful to bear in mind what a tree is. One definition can be found at the web site maintained by the National Institute of Standards and Technology (<a href="http://www.nist.gov/dads/HTML/tree.html">http://www.nist.gov/dads/HTML/tree.html</a>):

A data structure accessed beginning at the <u>root</u> node. Each <u>node</u> is either a <u>leaf</u> or an <u>internal node</u>. An internal node has one or more <u>child</u> nodes and is called the <u>parent</u> of its child nodes. All children of the same node are <u>siblings</u>. Contrary to a physical tree, the root is usually depicted at the top of the structure, and the leaves are depicted at the bottom.

As discussed by Applicant throughout the specification, but especially on page 11, line 9 through page 12, line 11 thereof, use of a tree provides many advantages in the context of

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Applicant's invention. The Examiner is encouraged to read this portion of the specification, which notes that subtrees "can be advantageously collapsed and expanded, deleted, copied, and pasted to other parts of the tree....By copying a subtree out of a single computer, the system administrator can configure a number of computers at once." Also, pieces can be dragged and dropped so that they automatically attach themselves to appropriate matching pieces on the tree.

Applicant notes further that other forms of presenting items, such as lists and shelves, would not offer the advantages to the user that are offered by the hierarchical tree representation of Applicant's invention. Indeed, it is difficult to see how a list, for example, could be used at all to implement important aspects of Applicant's invention.

With respect to the prior art cited by the Examiner, Keller "relates to a graphical user interface (GUI) allowing users to conveniently specify and alter the scheduling priority of one or more running processes represented by icons displayed on a computer screen..." (see col. 1, lines 5-10 of Keller). There would be <u>no reason</u> to display the icons of Keller in a hierarchical tree arrangement, since such a tree offers organizational levels, such as subtrees (which may be regarded as "shelves within shelves"), that are totally unnecessary for the purpose of simply ordering the scheduling priority of processes. Carlson, on the other hand, is directed to an apparatus that helps a user specify "the various phases of an experiment..." (see Abstract), and would likewise have <u>no need</u> for any hierarchical tree representation. The same can be said for Wajda, which is directed to a manner of identifying the compatibility of one application program with another program (see Abstract).

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Applicant also wishes to comment on his use "jigsaw" type pieces. Configuring pieces in this manner offers a number of advantages, which are discussed throughout the specification, but especially on page 10, line 17 through page 11, line 8 thereof. The Examiner is encouraged to read this portion of the specification. For example, "the visual design of the jigsaw pieces suggests which pieces will match or interconnect with each other..." (see page 10, lines 18-19 of the specification), but this also gives the user multiple options. Applicant notes that the use of an attachment piece as a solution to, or an implementation of, a task-to-be-completed that is represented by a connector piece offers the user a convenient visual representation of the possibility that more than one possible solution is at his or her disposal. To this end, see page 9, lines 21-22 of the specification, which discusses the possibility of installing one of a plurality of printers from which one can choose. There is no need to represent the icons of Keller with jigsaw-type shapes, since no mating or matching of connector and attachment pieces is required; the same can be said of Carlson. Even Wajda, which makes use of jigsaw puzzle type representations, is not concerned with finding a solution to a task by choosing from among multiple options.

In short, there is no motivation to combine the cited references. To do so would change the prior art methods so that they would no longer be appropriate for their intended use. See MPEP 2143.01.

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### New Claims

Applicant has added several new dependent claims to better claim the subject matter he regards as his invention.

Claim 20 is directed to using the method to install an operating system of a computer, as discussed in the specification on page 15, beginning on line 15.

Claim 21 is directed to applying the method to one of system administration, human resources administration, and procurement management, as discussed in the specification on page 13, beginning on line 11.

Claims 22, 27, and 32 are directed to the situation in which a *plurality* of attachment pieces having the same shape are displayed, "thereby providing the user with *more than one way* to complete the task corresponding to said same shape" (emphasis added), as shown in Figures 1 and 2 and discussed throughout the specification generally. This is a distinct advantage over <u>all</u> the teachings of the cited prior art.

Claims 23, 28, and 29 specify that the tasks to be completed may include the installation of software (see page 9, 14, and 15, for example) or the configuration of software (see page 8 of the specification, for example).

The other newly added dependent claims are directed to features that have already been discussed or that appear in other claims.

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### **Summary**

In view of this amendment, Applicant believes that all claims are in condition for allowance.

The Examiner is invited to call the undersigned if a telephone conference will expedite the prosecution of this application.

Respectfully submitted,

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